New York State Department of Environmental Conservation
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Joe Martens
Commissioner

February 11, 2014

Mr. Stanley Carey
Superintendent
Massapequa Water District
84 Grand Avenue
Massapequa, New York 11758

RE: Northrop Grumman and Naval Weapons Industrial Reserve Plant Site Operable Unit 2 (OU2) Offsite Groundwater, 130003A and 130003B.

Dear Mr. Carey

This letter responds to your January 30, 2014 correspondence for the ongoing Operable Unit 2 (OU2) Offsite Groundwater activities for the Northrop Grumman and Naval Weapons Industrial Reserve Plant (NWIRP) Site. Your letter asks about the submittal of two reports related to this project. These are the GM 38 Area Capture Zone Analysis Report being submitted by the Department of the Navy and the Onsite Containment (ONCT) System evaluation Report by the Northrop Grumman Corporation. Other topics of inquiry include the OU2 vertical profile boring (VPB) program schedule of field work, the scheduling of the Technical Advisory Committee meeting, and elevated analytical results from the Bethpage Water District Plant 6 No. well 6-2.

Please note that, as you may be aware, the OU2 portion of this project is in the Operation, Maintenance and Monitoring (OMM) phase. As such, the Department of the Navy, for their portion of the offsite work, has been submitting work plans, obtaining NYSDEC approvals, and starting up field work. As required by the Federal Facilities Site Remediation Agreement (FFSRA), periodic reports are submitted by the Navy. The OU2 progress report for the current field work for January 2014 is attached. NAVFAC-Midlant has also created an overall schedule for progress on the VPB field drilling. As additional tasks come up for OU2, they will be added to the schedule. This current schedule is attached to this letter.

The Navy has confirmed that the GM 38 Area Capture Zone Analysis report is complete, is currently undergoing internal review and will be submitted to the NYSDEC this month. The NYSDEC will then distribute this report. The ONCT Effectiveness Evaluation report will not be ready before July 2014. However Northrop Grumman will submit a preliminary report on the system that will contain information obtained from the profile borings completed to date. The Navy is in the process of installing a number of new borings in the areas downgradient of the Bethpage Water District. The information generated from some of these borings will be used to design new outpost wells for South Farmingdale and the Massapequa Water District. As these work plans are being generated, they will be distributed to the members of the technical Advisory Committee for review.

Regarding scheduling the next Technical Advisory Committee meeting, I have had discussions with most of the members consultants, including the Massapequa Water District's consultant and it appeared to me that there was a consensus that there was not enough progress to justify holding a meeting until the results of the recent field work were available. Travel by staff at both DEC and the Navy, is restricted, in varying degrees and if a meeting had been held in December or January, it is unlikely that travel would be approved when a meeting in April would much more productive and offer much more to discuss.

The NYSDEC has been aware of the elevated BWD Plant 6-2 results for some time. The Navy, in response to and under the general terms of the GM 75 Area investigation provision of the OU2 Navy ROD, has been continually looking to see if there is another source either up gradient or directly down gradient of the BWD Well 6-2 that needs to be addressed. The NYSDEC awaits the analytical data from this most recent VPB program to evaluate groundwater conditions upgradient of the Bethpage area and Bethpage Plant 6 for additional hotspots. The VPB analytical results will be available shortly.

I trust that this responds satisfactorily to your concerns and those of the Massapequa Water District raised in your January 30, 2014 letter. Thank you in advance for taking the time to have input on this project. Should you have any questions prior to the next TAC meeting on April 10th, 2014, please contact Mr. John Swartwout, P.E., Section Chief, or myself at (518)402-9620.

Sincerely,

Steven M. Scharf, P.E.
Project Engineer
Remedial Bureau A
Division of Environmental Remediation

Enclosure
ec:w/enc:
J. Harrington
J. Swartwout
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J. Reinhardt, LWD jreinhardt@tohmail.org
R. Humann, H2M
G. Loesch, H2M
P. Granger, H2M
B Merklin, D&B
L. Fly, NAVFAC Midlant
E. Hannon, NGC

NWIRP BETHPAGE ACTIVITY/PROGRESS UPDATE
OPERABLE UNIT 2 (OU2)
NWIRP BETHPAGE, NEW YORK
ACTIVITY PERIOD: JANUARY 2014

1. OU2 Summary and Progress

- Continue operating of the NYAW Interim GAC system
- NYAW conducted the NCDOH required startup testing to operate the new Pump 4.
- Approval to operate pump 4 is anticipated by the end of January/beginning of February.
- Tetra Tech down loaded the December 2013 water level recordings and submitted them to USGS.
- Continued drilling VPB-146 and finalizing drilling of VBP-144 (completed 1/23).
- Internally, prepare access agreements for outpost monitoring wells at MWD and SFWD.
- Continued operation of GM-38 Treatment System.
- Responding to comment from EPA regarding the work plan to installation of VPBs 145-147-(MWD) and VPBs 148-153 (SFWD).
- Internal Review of the GM-38 Capture Zone Analysis and Exit Strategy.
- Drafting response to the 27 January 2014 letter from NYSDEC

2. Planned Activity for Next Month (February)

During the next month, the Navy anticipates performing the following OU2 activities:

- Obtaining a contractor to erect the build for the full scale GAC system at NYAW
- Continue operating New York American Water (NYAW) Interim GAC system
- Coordinate surveying of the horizontal and vertical coordinates for each of the monitoring wells.
- Data loggers continue to record data.
- Submit the GM-38 Capture Zone Analysis
- Continue operation of GM-38 Treatment System.
- Mobilize to begin drilling at VBP-148 and continued drilling of VPB-146
- Mobilize to LWD OW 4-1 and 4-2 to repair outpost wells

Compiled Drilling Schedule - NWIRP Bethpage OU2_Jan 27 2014

Task Name	Duration	Start	Finish
VPBs 140-144 (ONCT) Schedule	*330 days*	*Mon 12/2/13*	*Fri 3/6/15*
Installation of VPB 144 (completed)			**Thu 1/23/14**
Installation of VPB 142 (completed)			**Tue 12/17/13**
Installation of VPB 140 (Rig #3)	40 days	Mon 3/24/14	Fri 5/16/14
Installation of VPB 141 (Rig #2)	40 days	Mon 3/31/14	Fri 5/23/14
Installation of VPB 143	40 days	Mon 5/26/14	Fri 7/18/14
Installatin of VPB 144 Well 110D2	20 days	Mon 7/21/14	Fri 8/15/14
Installation of VPB 144 Well 110D1	20 days	Mon 8/18/14	Fri 9/12/14
Installation of VPB 140 Well 106D2	20 days	Mon 9/15/14	Fri 10/10/14
Installation of VPB 140 Well 106D1	20 days	Mon 10/13/14	Fri 11/7/14
Installation of VPB 141 Well 107D2	20 days	Mon 11/10/14	Fri 12/5/14
Installation of VPB 141 Well 107D1	25 days	Mon 12/8/14	Fri 1/9/15
Installation of VPB 143 Well 109D2	20 days	Mon 1/12/15	Fri 2/6/15
Installation of VPB 143 Well 109D1	20 days	Mon 2/9/15	Fri 3/6/15

Note: Time is tallied in work days (5 days/week)

Task Name	Duration	Start	Finish
VPBs 148-153 (South Farmingdale)	*350 days*	*Mon 2/3/14*	*Fri 6/5/15*
Installation of VPB 148 (Rig#2)	40 days	Mon 2/3/14	Fri 3/28/14
Installation of VPB 149 (Rig #3)	40 days	Mon 5/19/14	Fri 7/11/14
Installation of VPB 150 (Rig #3)	40 days	Mon 7/14/14	Fri 9/5/14
Installation of VPB 151 (Rig #3)	40 days	Mon 9/8/14	Fri 10/31/14
Installation of VPB 152 (Rig #3)	40 days	Mon 11/3/14	Fri 12/26/14
Installation of VPB 153 (Rig#3)	45 days	Mon 12/29/14	Fri 2/27/15
Installation of VPB 148 Well 115D2 (Rig #1)	25 days	Mon 12/15/14	Fri 1/16/15
Installation of VPB 148 Well 115D1 (Rig #2)	20 days	Mon 3/9/15	Fri 4/3/15
Installation of VPB 149 Well 116D2 (Rig #1)	20 days	Mon 1/19/15	Fri 2/13/15
Installation of VPB 149 Well 116D1 (Rig#3)	20 days	Mon 3/2/15	Fri 3/27/15
Installation of VPB 150 Well 117D2 (Rig#1)	20 days	Mon 2/16/15	Fri 3/13/15
Installation of VPB 150 Well 117D1 (Rig#1)	20 days	Mon 3/16/15	Fri 4/10/15
Installation of VPB 151 Well 118D2 (Rig#3)	20 days	Mon 3/30/15	Fri 4/24/15
Installation of VPB 151 Well 118D1 (Rig#2)	20 days	Mon 4/6/15	Fri 5/1/15
Installation of VPB 152 Well 119D2 (Rig#1)	20 days	Mon 4/13/15	Fri 5/8/15
Installation of VPB 152 Well 119D1 (Rig#3)	20 days	Mon 4/27/15	Fri 5/22/15
Installation of VPB 153 Well 120D2 (Rig#2)	20 days	Mon 5/4/15	Fri 5/29/15
Installation of VPB 153 Well 120D1 (Rig#1)	20 days	Mon 5/11/15	Fri 6/5/15

Note: Time is tallied in work days (5 days/week)

Task Name	Duration	Start	Finish
VPBs 145-147 (Massapequa) - Rig#1	*240 days*	*Mon 1/13/14*	*Fri 12/12/14*
Installation of VPB 146	40 days	Mon 1/13/14	Fri 3/7/14
Installation of VPB 145	40 days	Mon 3/10/14	Fri 5/2/14
Installation of VPB 147	40 days	Mon 5/5/14	Fri 6/27/14
Installation of VPB 145 Well 112D2	20 days	Mon 6/30/14	Fri 7/25/14
Installation of VPB 145 Well 112D1	20 days	Mon 7/28/14	Fri 8/22/14
Installation of VPB 146 Well 113D2	20 days	Mon 8/25/14	Fri 9/19/14
Installation of VPB 146 Well 113D1	20 days	Mon 9/22/14	Fri 10/17/14
Installation of VPB 147 Well 114D2	20 days	Mon 10/20/14	Fri 11/14/14
Installation of VPB 147 Well 114D1	20 days	Mon 11/17/14	Fri 12/12/14

Note: Days are tallied as Work days - 5 per week